

REMARKS

REJECTIONS UNDER 35 U.S.C. § 103

Claims 1, 2, 4, 10-12, 46, 47, 49, 74-78 and 82

Claims 1, 2, 4, 10-12, 46, 47, 49, 74-78 and 82 were rejected under 35 U.S.C. § 103(a) as being unpatentable over *Gould* (previously cited) in view of *Roy III* (previously cited), and in further view of U.S. Patent Publication No. 2001/0036812 to Engstrom (*Engstrom*). Claims 10-12 have been cancelled without prejudice. Thus, the rejection of these claims is moot. Applicant submits claims 1, 2, 4, 46, 47, 49, 74-78 and 82 are not obvious in view of *Gould*, *Roy III*, and *Engstrom* for at least the reasons set forth below.

Claim 1 recites, in part, the following:

determining the quality of the wireless data transmission based on a quality parameter of the wireless data transmission and a propagation channel estimate of the wireless data transmission, wherein the propagation channel estimate is based at least in part on a channel condition number; and

Claims 46 and 76 recite similar limitations. The Office action states *Gould* and *Roy III* fail to disclose a propagation channel estimate of the wireless data transmission.

Engstrom is cited as disclosing the deficient limitations. *Engstrom* discusses link quality of a single telecommunication signal between a radio transmitter and receiver. See page 2, paragraph [0033].

Engstrom fails to disclose a wireless data transmission wherein the wireless data transmission includes multiple streams of data and originates from a spatial multiplexing system having multiple transmit antennae. Thus, *Engstrom* cannot be relied upon as disclosing a propagation channel estimate of the wireless data transmission, as recited in

claim 1. *Engstrom* is further deficient in that *Engstrom* does not disclose a propagation channel estimate based at least in part on a channel condition number. Thus, Applicant submits the combination of *Gould*, *Roy III*, and *Engstrom* fail to disclose at least one limitation of claims 1, 46, and 76. Accordingly, Applicant submits claims 1, 46 and 76 are not obvious in view of *Gould*, *Roy III*, and *Engstrom*.

Claims 2 and 4 depend from claim 1. Claims 47, 49 and 74-75 depend from claim 46. Claims 78 and 82 depend from claim 76. Given that dependent claims necessarily include the limitations of the claims from which they depend, Applicant submits claims 2, 4, 47, 49, 74-75, 77-78 and 82 are not obvious for at least the same reasons claims 1, 46 and 76 are not obvious.

Claims 3, 5-9, 13-14, 48, 50-56 and 80-83

Claims 3, 5-9, 13-14, 48, 50-56 and 80-83 were rejected under 35 U.S.C. § 103(a) as being unpatentable over *Gould* in view of *Roy III* and *Engstrom*, and further in view of various other cited references: specifically, claims 3, 5, 48 and 75 in view of U.S. Patent No. 6,141,388 issued to Servais et al. (*Servais*); claims 6, 13 and 14 in view of U.S. Patent No. 6,732,323 issued to Mitlin et al. (*Mitlin*); claim 8 in view of U.S. Patent No. 5,682,489 issued to Harrow et al. (*Harrow*); claim 7 in view of *Servais* and *Mitlin*; claim 9 in view of *Servais* and *Harrow*; claim 50 in view of *Servais* and further in view of U.S. Patent No. 6,636,994 issued to Waschura et al. (*Waschura*); claims 51, 56 and 83 in view of U.S. Patent No. 5,715,136 issued to Noe et al. (*Noe*); claims 52 and 55 in view of U.S. Patent No. 5,136,528 issued to Fordham et al. (*Fordham*); claim 53 in view of *Servais*, *Waschura*, and *Noe*; claim 54 in view of *Servais*, *Waschura*, and *Fordham*; claims 80 and 81 in view of *Waschura*; Applicant notes that the examination of the

claimed invention and the application of these numerous references is a significant task; Applicant thanks the Examiner for the thorough examination and the thorough analysis of the references.

Claims 13-14 have been cancelled without prejudice. Applicant respectfully submits that claims 3, 5-9, 48, 50-56 and 80-83 are not rendered obvious by the cited references for at least the following reasons. Each of the rejections made above is based on the application of *Gould*, shown above to be defective with respect to independent claims 1, 46 and 76 from which each of the above-listed dependent claims depends. The cited references do not cure the deficiencies of *Gould* noted above with respect to the independent claims. Applicant respectfully submits that a prima facie case of obviousness under MPEP § 2143 has not been established with respect to independent claims 1, 46 and 76 at least for failing to establish that the cited references disclose every element of the claimed invention. Because the independent claims are nonobvious, the dependent claims are also nonobvious. See MPEP § 2143.03.

CONCLUSION

For at least the foregoing reasons, Applicant submits that the rejections have been overcome. Therefore, claims 1-9, 46-56, 74-78 and 80-83 are in condition for allowance and such action is earnestly solicited. The Examiner is respectfully requested to contact the undersigned by telephone if such contact would further the examination of the present application.

Please charge any shortages and credit any overcharges to our Deposit Account number 02-2666.

Respectfully submitted,
BLAKELY, SOKOLOFF, TAYLOR & ZAFMAN, LLP

Date: January 24, 2008

/Jared S. Engstrom/
Jared S. Engstrom, Reg. No. 58,330
Attorney for Applicant

1279 Oakmead Parkway
Sunnyvale, CA 94085-4040
(503) 439-8778

I hereby certify that this correspondence is being submitted electronically via EFS Web on the date shown below.

Date: January 24, 2008

/Katherine Jennings/
Katherine Jennings